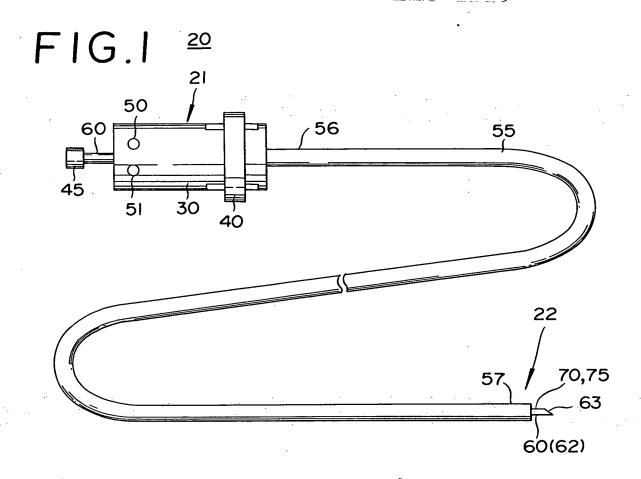
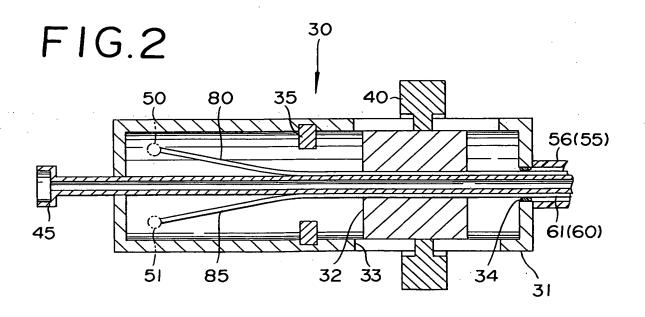
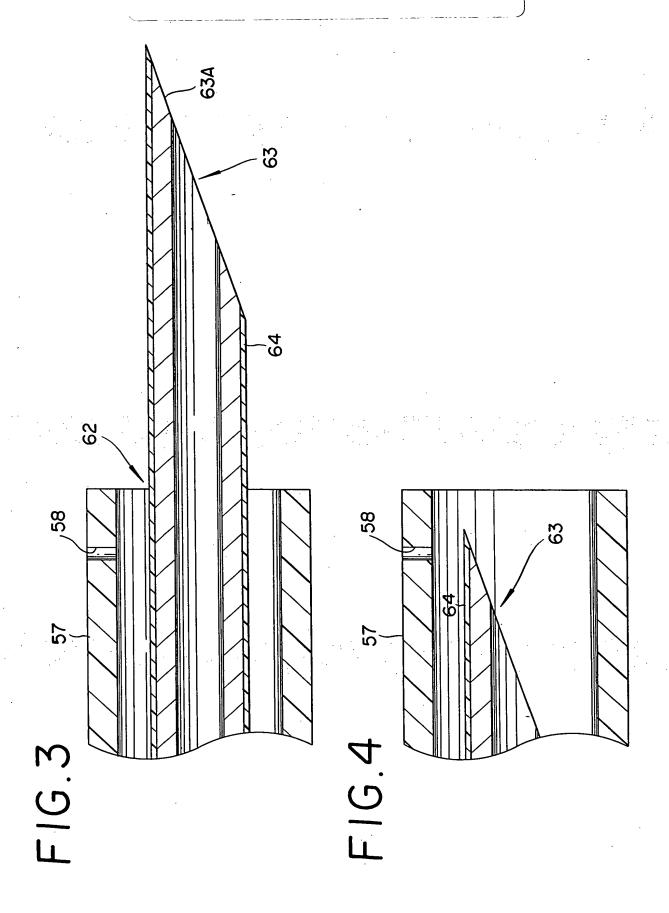
APPLN. FILING DATE: MARCH 26, 2004
TITLE: CATHETER WITH PUNCTURE SENSOR
INVENTOR(S): YAMAMOTO, TAKASHI ET. AL.
ATTORNEY DOCKET NO.: 011350-334 SHEET 1 OF 34

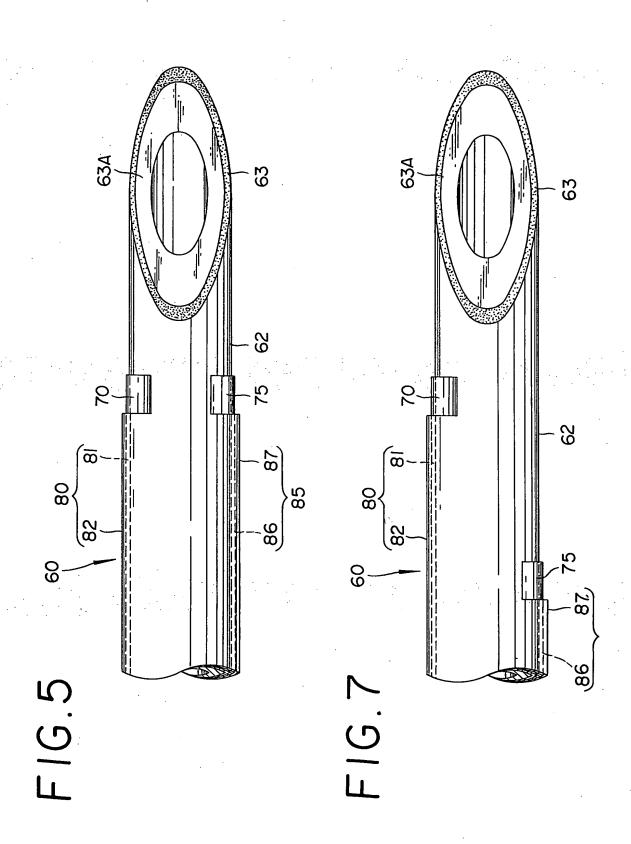




APPLN. FILING DATE: MARCH 26, 2004
TITLE: CATHETER WITH PUNCTURE SENSOR
INVENTOR(S): YAMAMOTO, TAKASHI ET. AL.
ATTORNEY DOCKET NO.: 011350-334 SHEET 2 OF 34

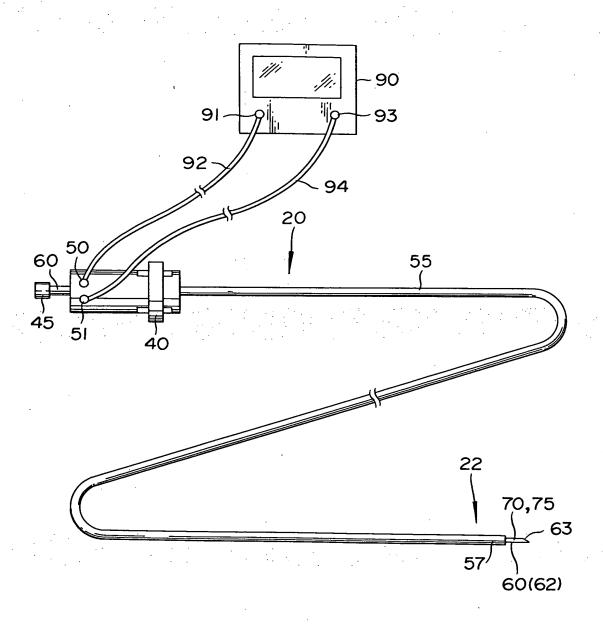


APPLN. FILING DATE: MARCH 26, 2004
TITLE: CATHETER WITH PUNCTURE SENSOR
INVENTOR(S): YAMAMOTO, TAKASHI ET. AL.
ATTORNEY DOCKET NO.: 011350-334 SHEET 3 OF 34

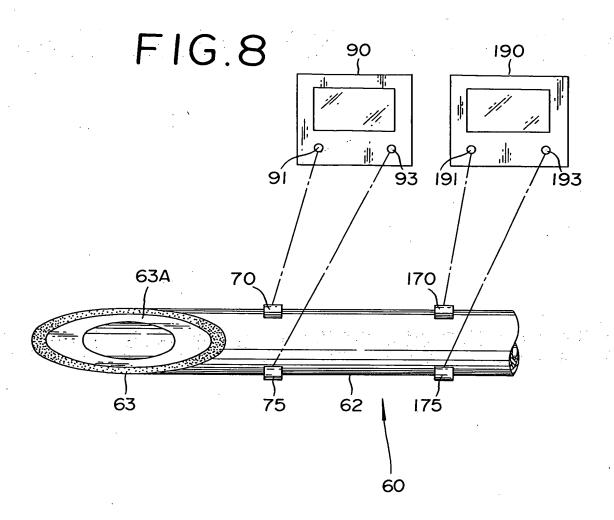


APPLN. FILING DATE: MARCH 26, 2004
TITLE: CATHETER WITH PUNCTURE SENSOR
INVENTOR(S): YAMAMOTO, TAKASHI ET. AL.
ATTORNEY DOCKET NO.: 011350-334 SHEET 4 OF 34

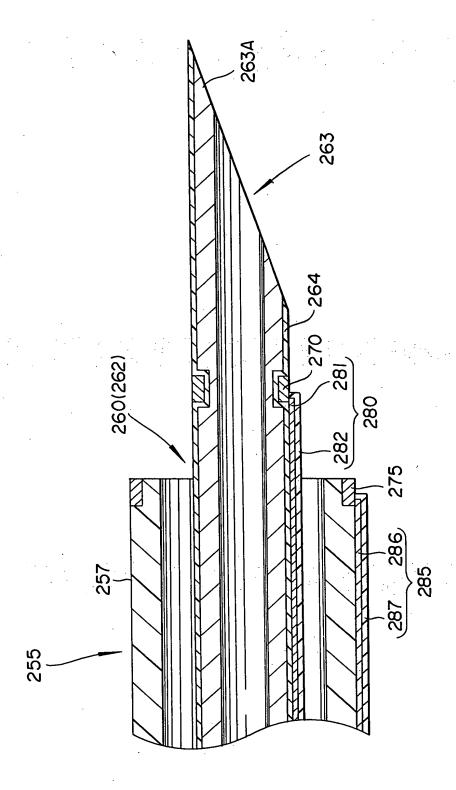
FIG.6



APPLN. FILING DATE: MARCH 26, 2004
TITLE: CATHETER WITH PUNCTURE SENSOR
INVENTOR(S): YAMAMOTO, TAKASHI ET. AL.
ATTORNEY DOCKET NO.: 011350-334 SHEET 5 OF 34



APPLN. FILING DATE: MARCH 26, 2004
TITLE: CATHETER WITH PUNCTURE SENSOR
INVENTOR(S): YAMAMOTO, TAKASHI ET. AL.
ATTORNEY DOCKET NO.: 011350-334 SHEET 6 OF 34



APPLN. FILING DATE: MARCH 26, 2004
TITLE: CATHETER WITH PUNCTURE SENSOR
INVENTOR(S): YAMAMOTO, TAKASHI ET. AL.
ATTORNEY DOCKET NO.: 011350-334 SHEET 7 OF 34

F1G.10

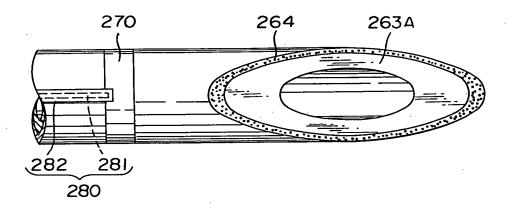
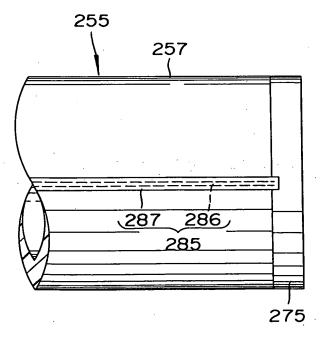
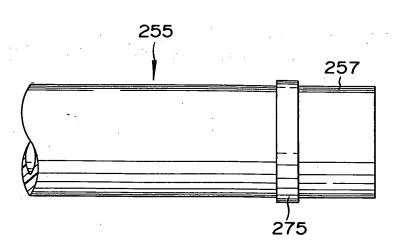


FIG.11



APPLN. FILING DATE: MARCH 26, 2004
TITLE: CATHETER WITH PUNCTURE SENSOR
INVENTOR(S): YAMAMOTO, TAKASHI ET. AL.
ATTORNEY DOCKET NO.: 011350-334 SHEET 8 OF 34

FIG.12



F1G.13

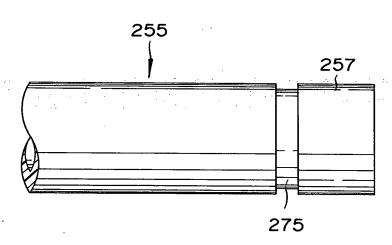
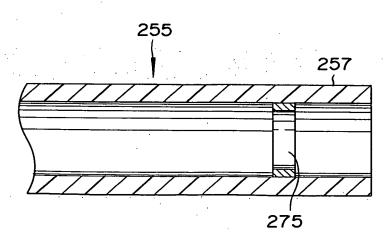
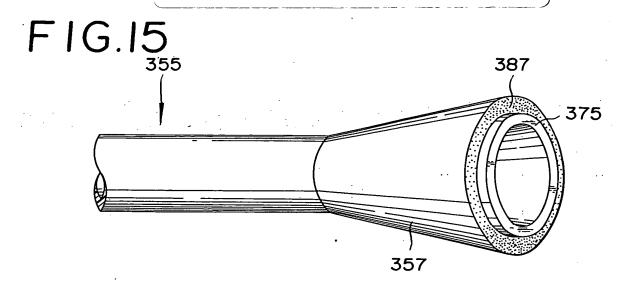
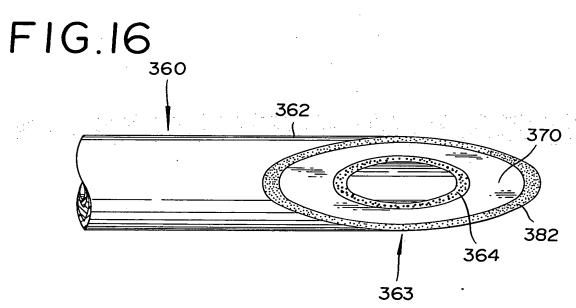


FIG.14

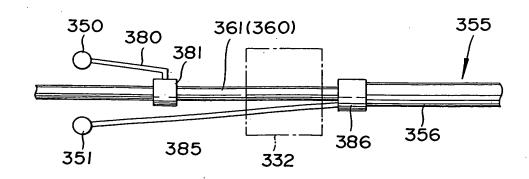


APPLN. FILING DATE: MARCH 26, 2004
TITLE: CATHETER WITH PUNCTURE SENSOR
INVENTOR(S): YAMAMOTO, TAKASHI ET. AL.
ATTORNEY DOCKET NO.: 011350-334 SHEET 9 OF 34

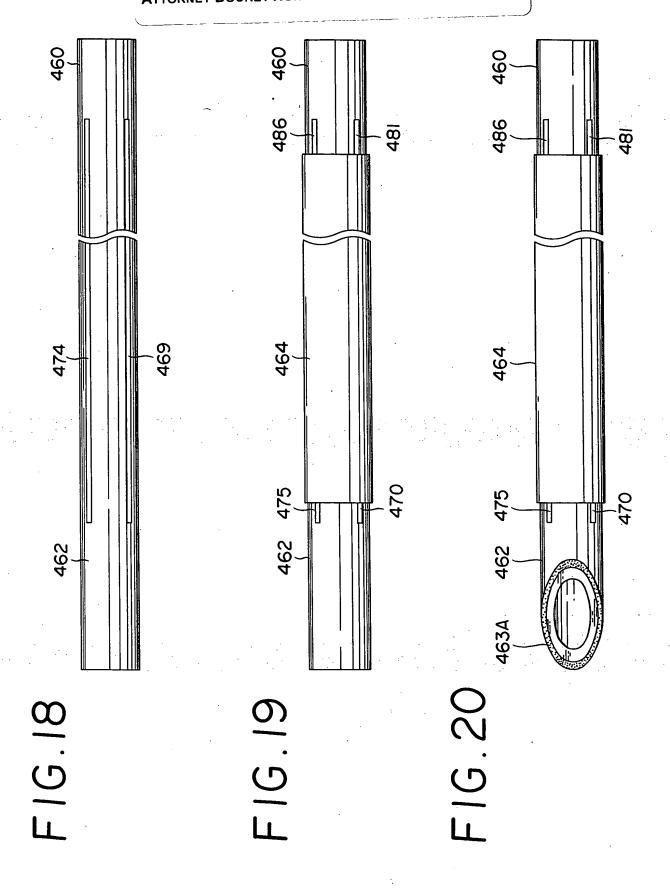




F1G.17

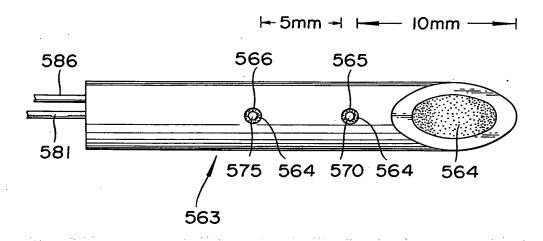


APPLN. FILING DATE: MARCH 26, 2004
TITLE: CATHETER WITH PUNCTURE SENSOR
INVENTOR(S): YAMAMOTO, TAKASHI ET. AL.
ATTORNEY DOCKET NO.: 011350-334 SHEET 10 OF 34

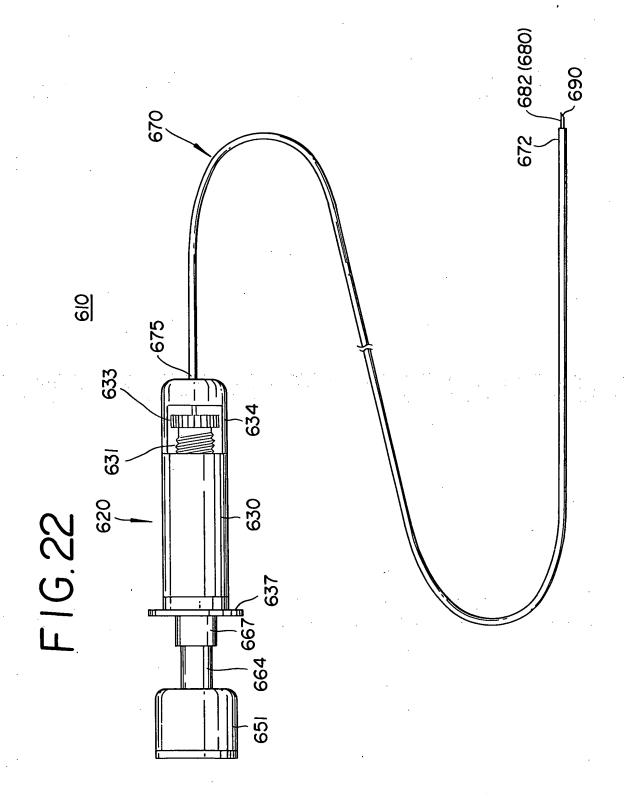


APPLN. FILING DATE: MARCH 26, 2004
TITLE: CATHETER WITH PUNCTURE SENSOR
INVENTOR(S): YAMAMOTO, TAKASHI ET. AL.
ATTORNEY DOCKET No.: 011350-334 SHEET 11 OF 34

## F1G.21



APPLN. FILING DATE: MARCH 26, 2004
TITLE: CATHETER WITH PUNCTURE SENSOR
INVENTOR(S): YAMAMOTO, TAKASHI ET. AL.
ATTORNEY DOCKET NO.: 011350-334 SHEET 12 OF 34



APPLN. FILING DATE: MARCH 26, 2004
TITLE: CATHETER WITH PUNCTURE SENSOR
INVENTOR(S): YAMAMOTO, TAKASHI ET. AL.
ATTORNEY DOCKET NO.: 011350-334 SHEET 13 OF 34

F1G.23

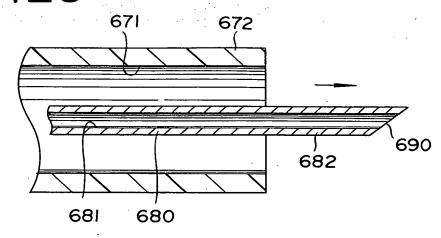
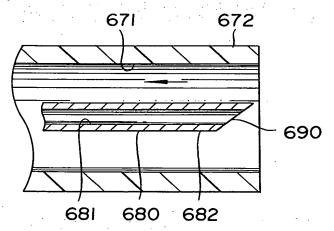


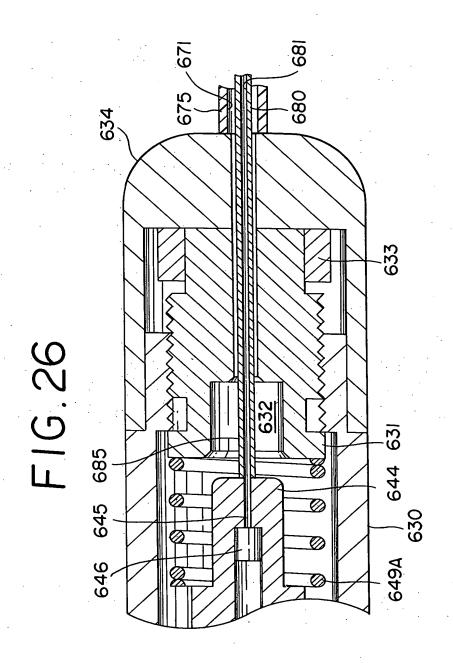
FIG. 24



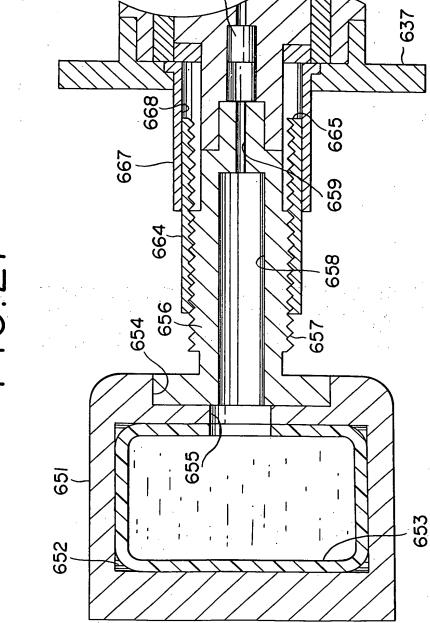
APPLN. FILING DATE: MARCH 26, 2004
TITLE: CATHETER WITH PUNCTURE SENSOR
INVENTOR(S): YAMAMOTO, TAKASHI ET. AL.
ATTORNEY DOCKET NO.: 011350-334 SHEET 14 OF 34

649A <u>620</u> 649B <u>(</u>899 656 

APPLN. FILING DATE: MARCH 26, 2004
TITLE: CATHETER WITH PUNCTURE SENSOR
INVENTOR(S): YAMAMOTO, TAKASHI ET. AL.
ATTORNEY DOCKET NO.: 011350-334 SHEET 15 OF 34

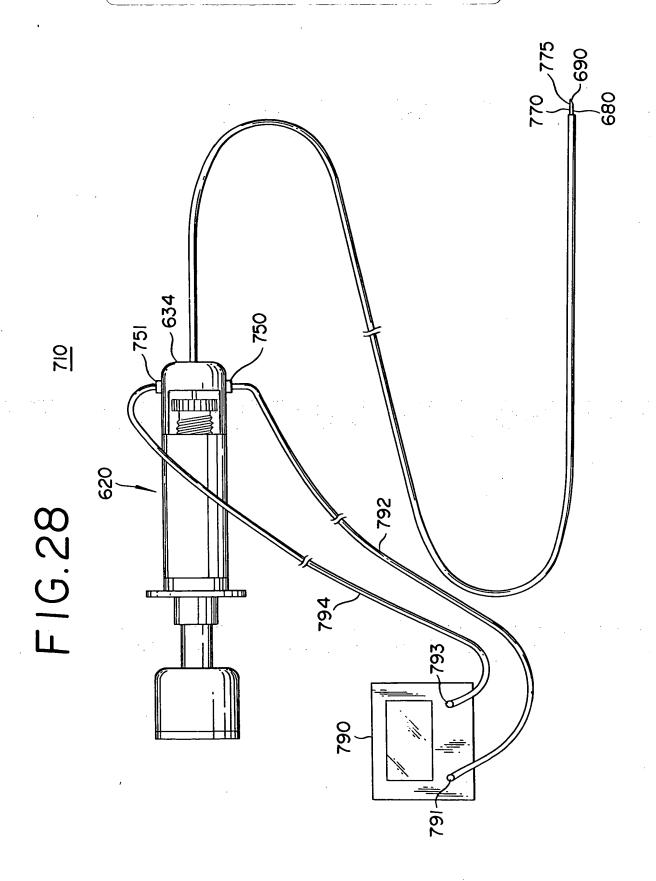


APPLN. FILING DATE: MARCH 26, 2004
TITLE: CATHETER WITH PUNCTURE SENSOR
INVENTOR(S): YAMAMOTO, TAKASHI ET. AL.
ATTORNEY DOCKET NO.: 011350-334 SHEET 16 OF 34



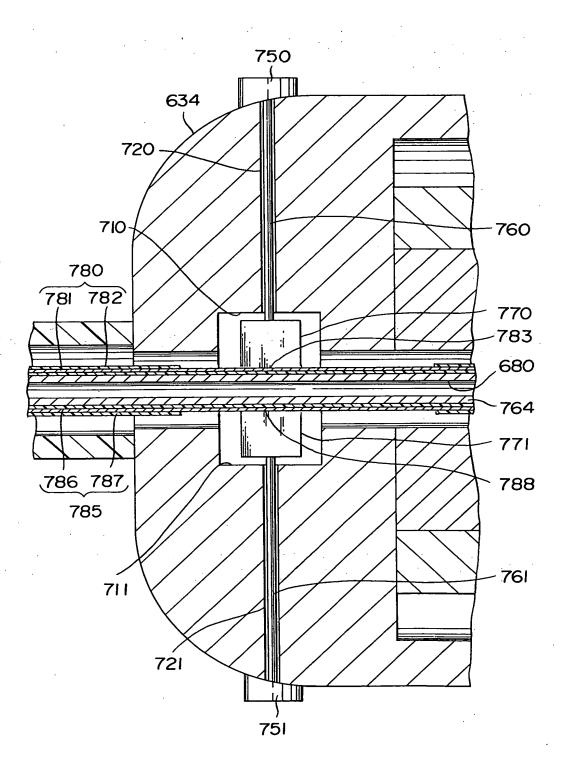
F16.27

APPLN. FILING DATE: MARCH 26, 2004
TITLE: CATHETER WITH PUNCTURE SENSOR
INVENTOR(S): YAMAMOTO, TAKASHI ET. AL.
ATTORNEY DOCKET NO.: 011350-334 SHEET 17 OF 34



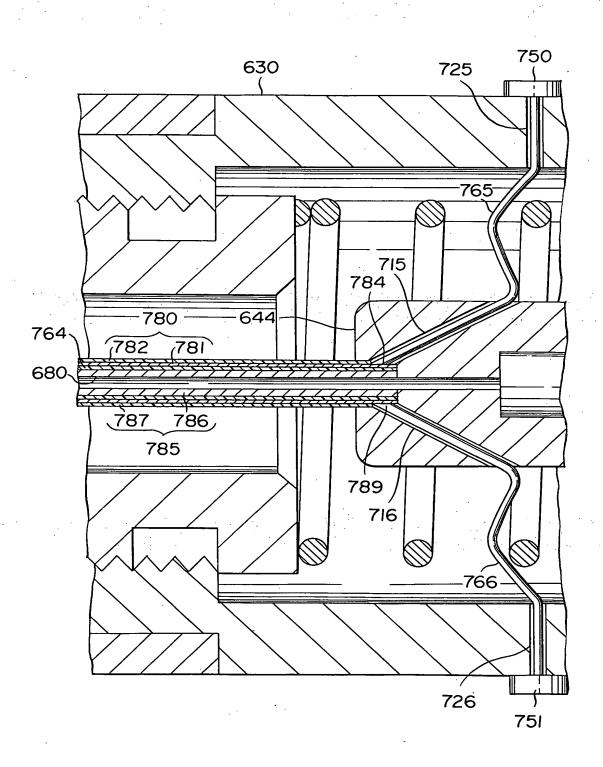
APPLN. FILING DATE: MARCH 26, 2004
TITLE: CATHETER WITH PUNCTURE SENSOR
INVENTOR(S): YAMAMOTO, TAKASHI ET. AL.
ATTORNEY DOCKET NO.: 011350-334 SHEET 18 OF 34

FIG.29

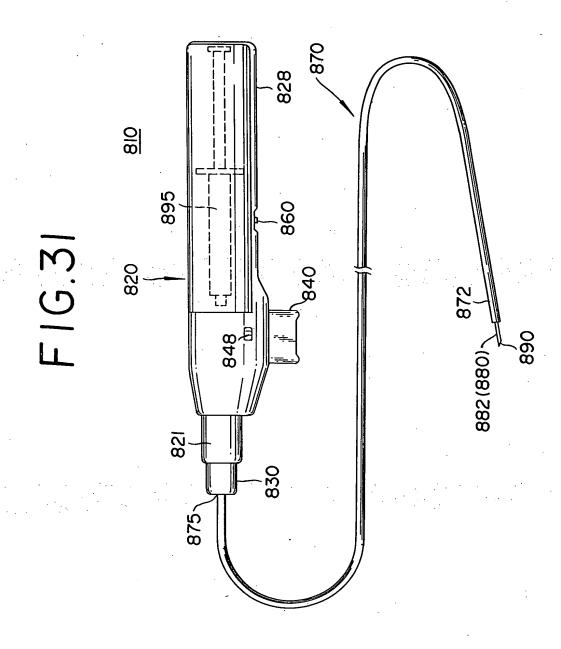


APPLN. FILING DATE: MARCH 26, 2004
TITLE: CATHETER WITH PUNCTURE SENSOR
INVENTOR(S): YAMAMOTO, TAKASHI ET. AL.
ATTORNEY DOCKET No.: 011350-334 SHEET 19 OF 34

## F1G.30

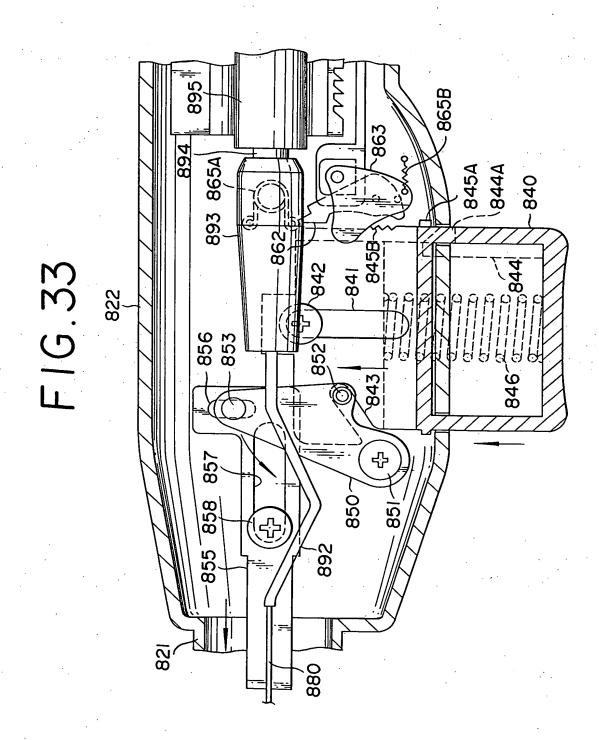


APPLN. FILING DATE: MARCH 26, 2004
TITLE: CATHETER WITH PUNCTURE SENSOR
INVENTOR(S): YAMAMOTO, TAKASHI ET. AL.
ATTORNEY DOCKET NO.: 011350-334 SHEET 20 OF 34

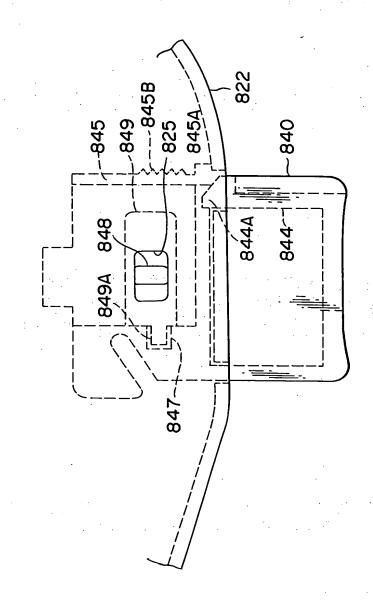


APPLN. FILING DATE: MARCH 26, 2004
TITLE: CATHETER WITH PUNCTURE SENSOR
INVENTOR(S): YAMAMOTO, TAKASHI ET. AL.
ATTORNEY DOCKET NO.: 011350-334 SHEET 21 OF 34

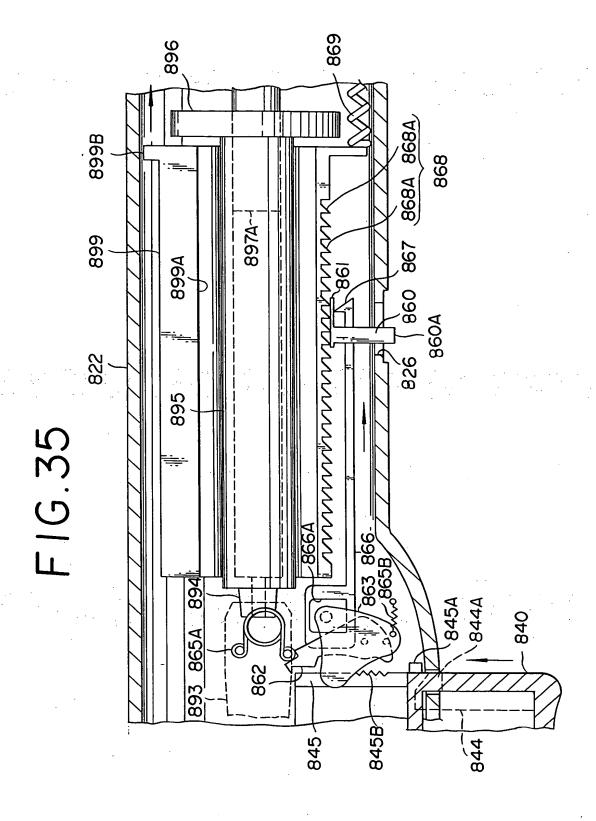
APPLN. FILING DATE: MARCH 26, 2004
TITLE: CATHETER WITH PUNCTURE SENSOR
INVENTOR(S): YAMAMOTO, TAKASHI ET. AL.
ATTORNEY DOCKET NO.: 011350-334 SHEET 22 OF 34



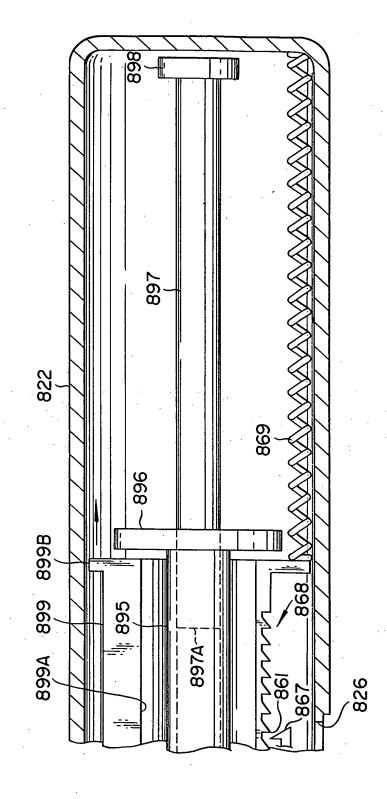
APPLN. FILING DATE: MARCH 26, 2004
TITLE: CATHETER WITH PUNCTURE SENSOR
INVENTOR(S): YAMAMOTO, TAKASHI ET. AL.
ATTORNEY DOCKET NO.: 011350-334 SHEET 23 OF 34



APPLN. FILING DATE: MARCH 26, 2004
TITLE: CATHETER WITH PUNCTURE SENSOR
INVENTOR(S): YAMAMOTO, TAKASHI ET. AL.
ATTORNEY DOCKET NO.: 011350-334 SHEET 24 OF 34

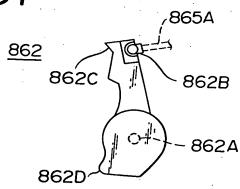


APPLN. FILING DATE: MARCH 26, 2004
TITLE: CATHETER WITH PUNCTURE SENSOR
INVENTOR(S): YAMAMOTO, TAKASHI ET. AL.
ATTORNEY DOCKET No.: 011350-334 SHEET 25 OF 34

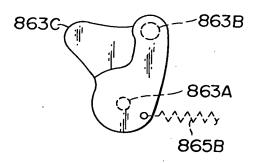


APPLN. FILING DATE: MARCH 26, 2004
TITLE: CATHETER WITH PUNCTURE SENSOR
INVENTOR(S): YAMAMOTO, TAKASHI ET. AL.
ATTORNEY DOCKET NO.: 011350-334 SHEET 26 OF 34

F1G.37

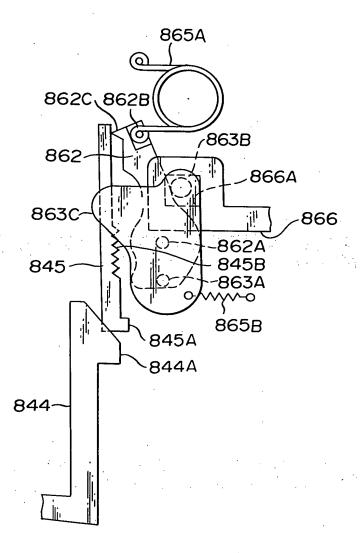


## F1G.38



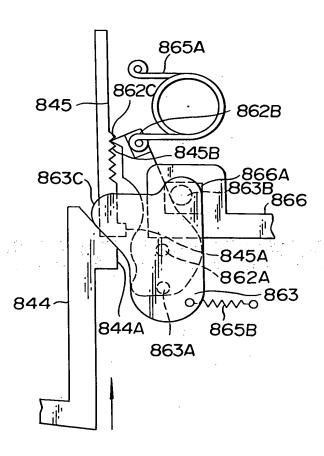
APPLN. FILING DATE: MARCH 26, 2004
TITLE: CATHETER WITH PUNCTURE SENSOR
INVENTOR(S): YAMAMOTO, TAKASHI ET. AL.
ATTORNEY DOCKET No.: 011350-334 SHEET 27 OF 34

F1G.39



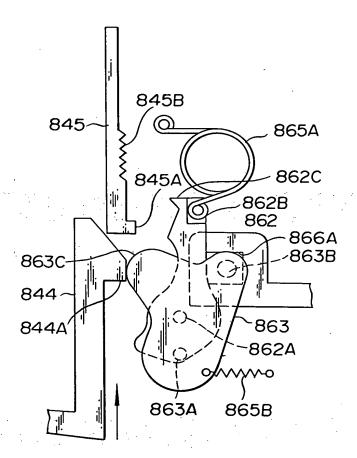
APPLN. FILING DATE: MARCH 26, 2004
TITLE: CATHETER WITH PUNCTURE SENSOR
INVENTOR(S): YAMAMOTO, TAKASHI ET. AL.
ATTORNEY DOCKET NO.: 011350-334 SHEET 28 OF 34

F1G.40

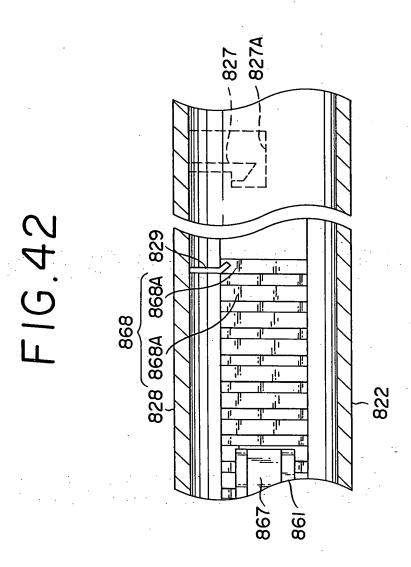


APPLN. FILING DATE: MARCH 26, 2004 TITLE: CATHETER WITH PUNCTURE SENSOR INVENTOR(S): YAMAMOTO, TAKASHI ET. AL. ATTORNEY DOCKET NO.: 011350-334 SHEET 29 OF 34

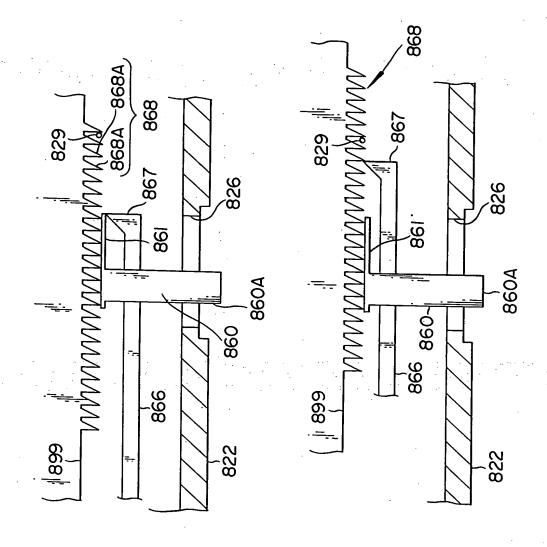
FIG.41



APPLN. FILING DATE: MARCH 26, 2004
TITLE: CATHETER WITH PUNCTURE SENSOR
INVENTOR(S): YAMAMOTO, TAKASHI ET. AL.
ATTORNEY DOCKET NO.: 011350-334 SHEET 30 OF 34

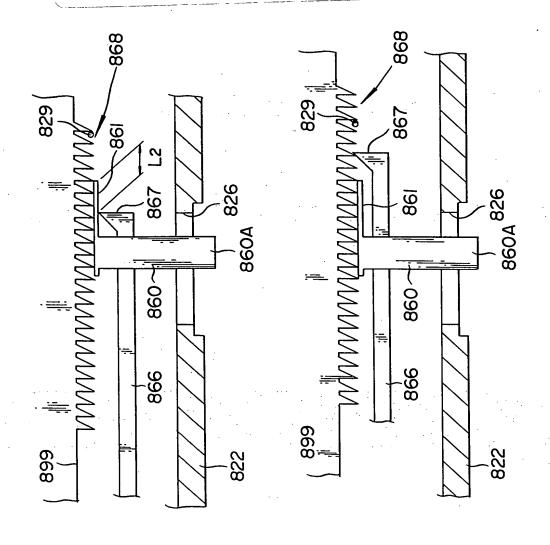


APPLN. FILING DATE: MARCH 26, 2004
TITLE: CATHETER WITH PUNCTURE SENSOR
INVENTOR(S): YAMAMOTO, TAKASHI ET. AL.
ATTORNEY DOCKET No.: 011350-334 SHEET 31 OF 34

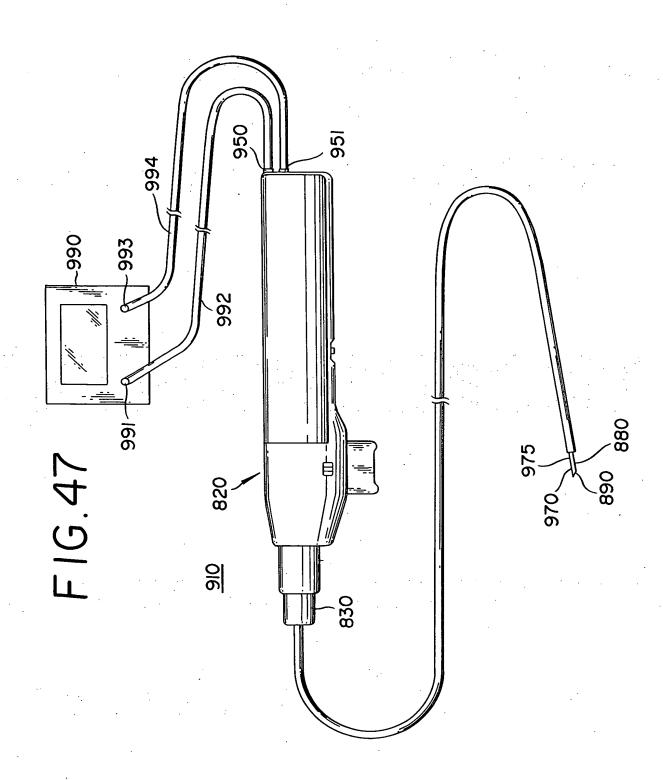


F16.44

APPLN. FILING DATE: MARCH 26, 2004
TITLE: CATHETER WITH PUNCTURE SENSOR
INVENTOR(S): YAMAMOTO, TAKASHI ET. AL.
ATTORNEY DOCKET NO.: 011350-334 SHEET 32 OF 34



APPLN. FILING DATE: MARCH 26, 2004
TITLE: CATHETER WITH PUNCTURE SENSOR
INVENTOR(S): YAMAMOTO, TAKASHI ET. AL.
ATTORNEY DOCKET NO.: 011350-334 SHEET 33 OF 34



APPLN. FILING DATE: MARCH 26, 2004
TITLE: CATHETER WITH PUNCTURE SENSOR
INVENTOR(S): YAMAMOTO, TAKASHI ET. AL.
ATTORNEY DOCKET NO.: 011350-334 SHEET 34 OF 34

F1G.48

